

ICC FLOWTECH™ LEACHING SYSTEM INSTALLATION GUIDE FOR THE STATE OF MASSACHUSETTS

Prior to installation, **ICC** Technologies, LLC must certify installers in **writing** as having passed Flowtech™ *Certification Training*. This designation certifies that the installer has passed **Flowtech™** certified training and has been approved.

Equipment needed	Materials needed
Backhoe	Flowtech™ Units
Laser	Barrier Paper/Fabric Mesh
Transit	Internal Couplings
Level	

Installation Instructions

The Flowtech™ systems may be installed on conventional sites that meet all other criteria for product standards for travel substitutes for use in soil absorption systems. These systems may be sized by ICC Technologies or their representative's.

1. After your local health department has approved size, configuration, and layout for the Flowtech™ System, mark with paint or stake the location of trenches and lines. Set correct tank, invert pipe, header line or distribution box and trench bottom elevations before installation of Flowtech™ units.
2. It is recommended, if smearing or glazing of trench sidewalls and bottom has occurred in clay soils, that these soil surfaces be raked or scarified.
3. The trench should be dug to a minimum width of about 12 inches up to a maximum of 10 feet. This not only saves labor in excavation, but also provides better load bearing capacity after backfilling is complete.
- 4a. Before installing, the Flowtech™ Leaching System trench should be level in all directions (both across and along the trench bottom) and should follow the contour of the ground surface evaluation (uniform depth), with all continuous adjoining 10-foot cylindrical bundles placed end to end, with central bundle distribution pipe interconnected, without any dams, stepdowns or other water stops.
- 4b. An engineer's level or equivalent shall be used for installation and inspection, when the surface slopes are greater than two percent, the bottom of the nitrification trenches shall follow the contour of the ground.

5. Remove plastic outer bag prior to placing units in the trench(es). Remove any plastic bags in the trench before system is covered.

6. Place Flowtech™ unit(s) in the Flowtech™ configuration approved by system design permit specified for the particular site. The top or center-most units containing pipe are joined end to end with an internal pipe coupler supplied. If additional aggregate units with no pipe are required, they should be butted against the other aggregate units with no pipe and do not require any type of connection. Please note, units without pipe should be installed prior to units with pipe in horizontal and triangular configuration.

7. Lead or header lines from distribution box or such device will be connected to the top or center-most Flowtech™ unit with pipe in each trench.

8. Flowtech EPS units can flex and fit in curved trenches as may be necessary to avoid trees, boulders, or other obstacles in the way.

9. Flowtech™ products with a "G" preface have 180 degrees of geotextile and 180 degrees of net with flanges. The units should be installed so that the side flanges are bent up, placed in a downward motion along the trench side or the unit already in the trench. These flanges will deter soil from infiltrating between other units or sidewalls when backfilling. The geotextile will act as a barrier to prevent the soil from infiltrating the system and should always be in the up position. For added protection, the installer/designer should consider the addition of approved paper or geotextile.

10. The soil cover over the leaching field should be at least six inches in depth.

11. A minimum depth of at least six inches of soil covering finished grade over leaching field should be adhered to.

12. To prevent the ponding of surface water, soil cover above the original grade should be placed at a uniform depth over the entire leaching field.

13. After proper preparation of original ground surface, soil cover should be placed over leaching field.

Repeat steps 1 thru 13 for each required trench.

**THESE INSTALLATION INSTRUCTIONS
SUPERSEDE ALL PRIOR INSTRUCTIONS
OCTOBER 12, 2007**